

Deepwater Horizon (DWH) Oil Spill

Alabama and Mississippi – 2010/2011



A view of the oil source in May 2010. Credit: NOAA.

What was the need?

On April 20, 2010, the Deepwater Horizon drilling unit exploded off the coast of Louisiana, resulting in 11 deaths and the largest marine petroleum release in history. A few months after the explosion, the Centers for Disease Control and Prevention (CDC) in collaboration with state and local health departments conducted multiple Community Assessments for Public Health Emergency Response (CASPERs) to assess the general and mental health needs of affected coastal communities in Alabama and Mississippi.

What were the objectives?

The goals of the initial CASPERs in 2010 were to assess the physical and mental health concerns of the affected Gulf Coast communities. Because mental health needs continue to evolve following disasters and anecdotal reports continued in the communities, we repeated the CASPERs one year later. The goals of the CASPERs in 2011 were the following:

- Better understand physical and mental health effects a year after the event
- Evaluate effectiveness of the increased mental health services along the coast and plan future outreach
- Assess emergency preparedness planning in the community



Photo courtesy NOAA

KEY RESULTS

- 9–15% of individuals self-reported symptoms of depression in 2011 compared to 15–26% in 2010
- 13–20% of individuals self-reported symptoms consistent with anxiety disorder compared to 21–32% in 2010
- 13–18% of individuals self-reported 14 or more mentally unhealthy days in the past 30 days compared to 16–23% in 2010
- 82–91% of households with pets planned on taking their pets with them during an evacuation

What was the outcome?

The initial CASPERs conducted after the DWH oil spill in 2010 helped state and local health departments obtain grants to increase mental health services in the affected communities. The 2011 follow-up CASPERs gave an opportunity to assess the mental health of the affected communities in Alabama and Mississippi and evaluate their mental health services.

Although data suggested that Gulf Coast households reported fewer symptoms of depression and anxiety in 2011 than in the months immediately following the oil spill, households still reported more symptoms than before the oil spill in 2009, suggesting a continued need for services.

CASPER data were used to support the continued need for mental health services and programs along the coast and to update preparedness planning for future human-induced and natural disasters.

Where can I find more information?

Reports on the CASPERs related to the DWH oil spill are available online at

<http://www.adph.org/CEP/assets/CASPERReport2011.pdf> and <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4570265/>